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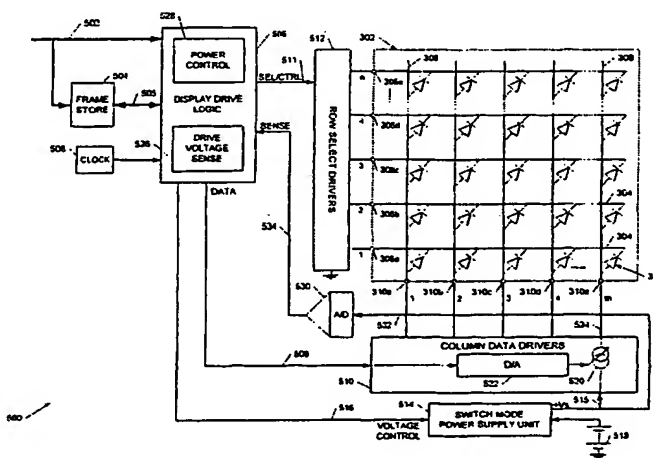
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**(54) Title: DISPLAY DRIVER CIRCUITS FOR ELECTROLUMINESCENT DISPLAYS, USING CONSTANT CURRENT GENERATORS**



**(57) Abstract:** Display driver circuits are described for driving an organic light emitting diode display, particularly a passive matrix display with greater efficiency. The display (302) comprises at least one electroluminescent display element, and the driver including at least one substantially constant current generator (520) for driving the display element. The display driver-control circuitry comprises a drive voltage sensor (526) for sensing a voltage on a first line in which the current is regulated by said constant current generator; and a voltage controller (528) coupled to said drive voltage sensor for controlling the voltage of a supply (514, 515) for said constant current generator in response to said sensed voltage, and configured to control said supply voltage to increase the efficiency of said display driver.

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